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| Appellants:      | Kim et al.        | Docket No.: | 16791            |
| Serial No.:      | 09/990,787        | Group:      | 3761             |
| Confirmation No: | 3121              | Examiner:   | Karin M. Reichle |
| Filed:           | November 14, 2001 | Date:       | April 22, 2004   |

For: Cover sheet for personal care products.

**Brief on Appeal to the Board of Patent Appeals and Interferences**

Mail Stop Appeal Brief - Patents  
Commissioner For Patents  
P.O. Box 1450  
Alexandria, VA 22313-1450

Sir:

Pursuant to 37 C.F.R. 1.192 Appellants respectfully submit this Brief in support of their Appeal of Examiner Reichle's **Final Rejection** of claims 1 - 16 which was mailed on November 25, 2003.

On February 25, 2004, Appellants, pursuant to 37 C.F.R. 1.191 mailed a timely Notice of Appeal. Thus, the time period for filing this Brief ends on April 25, 2004.

In accordance with 37 C.F.R. 1.192(a) this Appeal Brief is filed in triplicate.

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**Real Party in Interest**

The present Application has been assigned to the Kimberly-Clark Worldwide, Inc.

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**Related Appeals and Interferences**

There are no related appeals or interferences known to the Appellants, the Appellants' legal representative, or assignee which will directly affect or be directly affected by or have a bearing on the Board's decision in the pending appeal.

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**Status of the Claims**

Claims 1 – 10 and 13 - 16 remain in the application with claims 1 – 10 and 13 - 16 being finally rejected.

No Claims have been withdrawn and claims 11 and 12 have been cancelled.

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**Status of Amendments Filed Subsequent to Final Rejection**

An Amendment After Final was submitted on January 9, 2004. Appellants' Amendment After Final included the cancellation of claims 11 and 12.

By way of an Advisory Action mailed January 29, 2004, the Examiner considered the request for reconsideration but did not find the application to be in condition for allowance and did not enter the proposed amendments. The Examiner inadvertently failed to acknowledge or to enter the cancellation of claims 11 and 12.

All of the amendments to the drawings have been approved by the Examiner. Certain informalities with the drawings have been objected to by the Draftsman. The Appellants stand ready to address the informalities with corrected drawings on indication of allowable subject matter.

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**Summary of the Invention**

The Appellants have invented a liner (31) for personal care products having a hydrophilic first bodyside apertured nonwoven layer (41) laminated with a hydrophobic second apertured layer (42), which lies underneath the hydrophilic first bodyside layer (41). The inventors have found that it is advantageous to have a hydrophilic first bodyside layer (41) as the outermost bodyside part of the liner (31), in contact with the wearer (page 10, lines 6-7 and FIG. 3). Such a configuration allows for a very rapid absorption of fluids (page 10, lines 7-8). The hydrophobic second layer (42) is important to significantly reduce the ability of liquid that has reached the absorbent core (23) of the personal care product from moving upwards back toward the wearer (page 10, lines 14-15). However, having a hydrophobic second layer (42) between the hydrophilic first bodyside layer (41) and the absorbent core (23) can impede the liquid from traveling from the wearer to the absorbent core. The apertures (55) of the layers are thus important to allow for the movement of liquid from the wearer to the absorbent core (23) (page 10, line 14 to page 11, line 6).

The apertures (55) of the layers may be aligned. The hydrophilic first bodyside layer (41) can be made up of fibers having durable hydrophilicity. The hydrophobic second layer (42) can be made up of fibers with non-durable hydrophilicity (later made hydrophobic). The liner (31) may be made by a spunlace process. The liner may further have a treatment applied to the hydrophilic first bodyside layer (41), where the treatment may be aloe, vitamin E, mineral oil, baking soda and combinations thereof.

Another embodiment of the liner (31) of the present invention has a hydrophilic first bodyside layer (41) made from staple, naturally hydrophilic fibers hydroentangled to form a laminate with a second nonwoven layer (42) made from hydrophobic fibers, where the liner (31) is apertured to produce apertures (55) with an open area of 10 to 50 percent of the total surface area of the liner (31). The liner

(31) may further have a hydrophilic first bodyside layer (41) made from hydrophilic fibers of rayon, pulp, cotton, naturally hydrophilic fibers, and mixtures thereof. The hydrophobic fibers of the second hydrophobic layer (42) may be made from polymers like polyolefins, polyesters, acrylics and mixtures thereof.

Another embodiment of the invention is a pantliner (see FIG. 2) having a liquid permeable liner (31), a liquid impervious baffle (27), and an absorbent core (23) positioned therebetween. The liner (31) has a hydrophilic first apertured bodyside nonwoven layer (41) laminated according to a spunlace process with a hydrophobic second apertured nonwoven layer (42). Again, the apertures (55) of the hydrophilic first bodyside layer (41) and the hydrophobic second layer (42) may be aligned.

Finally, a process for making a liner (31) for personal care products is also disclosed. The process involves hydroentangling a hydrophilic first bodyside nonwoven layer (41) with a hydrophobic second nonwoven layer (42) and aperturing the layers. The layers may be apertured simultaneously to produce aligned apertures (55).

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#### **The Issues Presented**

Claims 1 – 16 stand rejected under 35 U.S.C. § 102(b) as anticipated by PCT patent publication number WO 98/42290 to Chen et al.

For claim 1 the Examiner points to Figures 1, 5 and 14 of Chen et al. and states:

In regard to claim 1, the hydrophilic first layer is 1 and the hydrophobic second layer is 2, see also page 5, line 26, page 6, lines 3-4, 8 and the second full paragraph, page 7, lines 2-4 and 29-30, page 12, lines 10-11, page 37 lines 5-6, 10-11, 27 and 31-32, the paragraph bridging pages 41-42, page 48, the second full paragraph, page 51, line 22 and page 52, lines 11 et seq of Chen.

The Examiner continues the rejection of the other claims as follows:

With regard to claims 2, 14 and 16, see page 42, first full paragraph. With regard to claim 3, see page 4, lines 6-7 for example. With regard to claim 4, see page 38, lines 24-28 and page 53, last paragraph. With regard to claims 15 and 5, see page 44, lines 5-10, page 47, last five lines, page 46, lines 28-31 and page 53, lines 4-23. With regard to claim 6, see page 5, line 10, page 44, line 27, page 46, lines 24-26 and page 47, the second full paragraph. With regards to claims 7, 8, 10-11 and 15, see the portions cited with regard to claims 1-6 and page 6, lines 28-29 and page 53, lines 24-25. With regard to claim 9, see page 51, line 6. With regard to claims 12, and 13, see page 10, lines 7-9.

In Appellants' reponse mailed September 12, 2003, Appellants amended the independent claims (claims 1, 7, 13 and 15) to clarify that the hydrophilic first nonwoven layer was the bodyside layer of the liner, i.e., the layer that is in contact with the wearer. The Examiner indicated in her response mailed November 25, 2003 that such an amendment did not overcome the rejection with

respect to Chen et al. With regard to the amendmended claims, the Examiner made the following statement:

Specifically, the claims do not require the hydrophilic layer be the uppermost body contacting layer of the liner just that it is bodyside, i.e. closer to the body than a second hydrophobic layer.

Claims 1-16 also stand objected to because of informalities in claims 1, 7, 13, and 15. The Examiner has made the following statement regarding appropriate correction:

(In) claims 1, 7, 13 and 15, "bodyside"(all) should be --body-faceable side--. In claim 7, last line, "the ... area" should be --a total surface area of the laminate--.

Additionally, claims 11 and 12 also stand rejected under 35 U.S.C. § 112, second paragraph, as being indefinite for failing to particularly point out and distinctly claim the subject matter which applicant regards as the invention.

Accordingly, it would appear that several distinct issues have been raised. These are:

**(A) Is every element of the claimed invention anticipated by the Chen et al. reference in the sense of 35 U.S.C. § 102(b)?**

**(B) Do objectionable informalities exist within the claims which require correction?**

**(C) Does the claimed invention fail to particularly point out and distinctly claim the subject matter regarded as the invention, rendering the claimed invention indefinite in the sense of 35 U.S.C. § 112, second paragraph?**

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#### **Grouping of the Claims**

The rejected claims do not all stand or fall together. The claims should be considered in two (2) groups based on two (2) categories of limitations recited in the claims. Arguments stating reasons why each group is separately patentable are included in the "Argument" section. The claims should be separated into the following groups:

**Group I** (claims 1-10 and 15-16) drawn to a liner for personal care products having a first hydrophilic bodyside nonwoven layer laminated to second hydrophobic nonwoven layer; and

**Group II** (claims 13-14) drawn to a pantiliner having liquid permeable liner (as previously defined), a liquid impervious baffle, and an absorbent core positioned therebetween.

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## Argument

For a prior art reference to anticipate in terms of 35 U.S.C. § 102(b), every element of the claimed invention must be identically shown in a single reference. Atlas Powder v. E.I. du Pont, 224 USPQ 409 (Fed. Cir. 1984).

It is quite clear that structural language of claims 1 – 16 recite an essential element of the present invention that is absent from Chen et al. That is, the hydrophilic first bodyside layer (41) of the liner makes up the bodyside of the liner. The hydrophobic second layer (42) will thus be the non-bodyside layer of the same inventive liner material. As such, when the hydrophilic first bodyside layer of the liner is incorporated into a personal care product, it will be the layer that comes into contact with the body of the wearer, while the hydrophobic second layer will face away from the body of the wearer.

Chen et al. teaches a dual-zoned absorbent web comprised of a web of wet-resilient, hydrophilic basesheet with a three-dimensional topography with elevated regions onto which hydrophobic matter is deposited. The hydrophobic material is deposited on the uppermost regions of the hydrophilic web. See Chen et al. at page 3, lines 12-16; paragraph bridging pages 3 and 4; embodiments on page 9 to page 11; paragraph bridging pages 35 and 36; paragraph bridging pages 42 and 43; and Figures 1, 5 and 14 where 1 is the hydrophilic basesheet and 2 is the hydrophobic material. Chen et al. teaches that the hydrophobic material is placed in position to be against the wearer's skin in order to increase a feeling of dryness, and in some embodiments, improve softness. See Chen et al. at page 3, lines 8 – 17; paragraph bridging pages 3 and 4; page 5, lines 20 – 22; page 35, lines 28 – 29; and paragraph bridging pages 50 – 51.

In contrast the **Group I** claims (claims 1-10 and 15-16) require that the hydrophilic layer of the material be the bodyside layer of the liner material. The hydrophobic second layer (42) is laminated to the hydrophilic first bodyside layer (41) and would necessarily be underneath the hydrophilic first bodyside layer, on the inside or non-bodyside side of the liner material. Chen et al. teaches a material with the exact opposite layering of hydrophilic and hydrophobic layers than the Appellants' inventive material. Chen et al. teaches the hydrophobic layer to be against the body of the wearer in contrast to the Appellants' claims of the hydrophilic bodyside layer being positioned against the body of the wearer.

The Examiner indicated in her response mailed November 25, 2003 that the term "bodyside" indicates that the hydrophilic layer is just "closer to the body than the second hydrophobic layer." However, the specification is quite clear in stating that the advantage of the inventive material is in having the "hydrophilic layer as the outermost bodyside of the liner, in contact with the wearer" (page 10, lines 6-7). As discussed in the specification, the hydrophilic bodyside layer of the inventive material is not merely closer to the body of the wearer, but it is in contact with the wearer.

Thus, with respect to the **Group I** claims, Chen et al. fails to show every element of the Appellants' invention and therefore does not anticipate the **Group I** claims in the sense of 35 U.S.C. §

102(b). In view of the above, the position that the Appellants' invention is disclosed by Chen et al. is untenable.

The **Group II** claims (claims 13-14) has the same inventive liner material as in the **Group I** claims, but further reinforces the fact that the hydrophilic layer would face the body of the wearer by the liner's relationship with the other components of the pantiliner claimed. The **Group II** claims claim a pantiliner made up of a liquid permeable liner, a liquid impervious baffle, and an absorbent core positioned therebetween. This is illustrated in FIG. 3 and Example 1 of the Appellants' specification. The liquid permeable liner is the inventive liner as discussed above with a hydrophilic first bodyside layer (41) and a hydrophobic second layer (42). In relation to the other components of the pantiliner, the hydrophilic first bodyside layer (41) of the inventive liner (31) would have to be the layer in contact with the skin of the wearer and the hydrophobic second layer (42) would have to face the absorbent core (23) and baffle (27) of the product.

Chen et al. teaches the exact opposite of the Appellants' inventive material. Again, Chen et al. teaches the hydrophobic layer to be against the body of the wearer and Appellants claim the hydrophilic layer is against the body of the wearer. Thus, with respect to the **Group II** claims, Chen et al. fails to show every element of the Appellants' invention and therefore does not anticipate the **Group II** claims in the sense of 35 U.S.C. § 102(b). In view of the above, the position that the Appellants' invention is anticipated by Chen et al. is untenable.

With regard to the objection to informalities of claims 1, 7, 13 and 15, it is the Appellants' position that these objections are not applicable or were addressed in the Appellants' Amendment After Final, submitted on January 9, 2004. As discussed above in the arguments with regard to the **Group I** and **Group II** claims, the term "bodyside" is clear with respect to the specification. In Appellants' Amendment After Final, the Appellants did not amend the language of claims 1, 7, 13, and 15 to replace "bodyside" with "body-faceable", but instead used alternate terminology to more clearly indicate that the first hydrophilic layer was in contact with the body of the wearer. This amendment was not entered by the Examiner, but for the reasons discussed above, it is the Appellants' position that the claims clearly point out and distinctly claim the Appellants' invention and thus the objection for informality is untenable.

The Examiner further objected to language present in the last line of claim 7. In the Appellants' Amendment After Final, the Appellants did conform claim 7 to the language suggested by the Examiner regarding the "total surface area of the laminate." The Examiner refused to enter the amendments to claim 7, either in total or in part, in the Advisory Action mailed January 29, 2004. It is the Appellants' position that the objection of claim 7 for informalities is untenable. However, to remove this issue, Appellants stand ready to resubmit the amendment previously proposed but not entered by the Examiner.

With regard to the indefiniteness rejection of claims 11 and 12, under 35 U.S.C. § 112, second paragraph, Appellants submitted an Amendment After Final on January 9, 2004 which included the cancellation of claims 11 and 12. The Examiner has inadvertently failed to note the cancellation of these claims in the Advisory Action mailed January 29, 2004. As claims 11 and 12 have been cancelled, the indefiniteness rejection of claims 11 and 12 is moot.

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#### **Appendix – The Claims On Appeal**

The claims on appeal are:

- 1) A liner for personal care products comprising a hydrophilic first bodyside apertured nonwoven layer laminated with a hydrophobic second apertured nonwoven layer.
- 2) The liner of claim 1 wherein said the apertures of the first layer and the apertures of the second layer are aligned.
- 3) The liner of claim 1 wherein said first layer comprises fibers with durable hydrophilicity.
- 4) The liner of claim 1 wherein said second layer comprises fibers with non-durable hydrophilicity.
- 5) The liner of claim 1 wherein said layers are laminated by a spunlace process.
- 6) The liner of claim 1 further comprising a treatment applied to said hydrophilic first layer, said treatment selected from the group consisting of aloe, vitamin E, mineral oil, baking soda and combinations thereof.
- 7) A liner for personal care products comprising a first bodyside nonwoven layer comprising staple, naturally hydrophilic fibers hydroentangled with a second nonwoven layer comprising hydrophobic fibers to form a laminate, wherein said laminate is apertured to produce apertures with an open area of 10 to 50 percent of the total surface area.
- 8) The liner of claim 7 wherein said first layer comprises hydrophilic fibers selected from the group consisting of rayon, pulp, cotton, naturally hydrophilic fibers, and mixtures thereof.
- 9) The liner of claim 7 wherein said second layer comprises hydrophobic fibers made from polymers selected from the group consisting of polyolefins, polyesters, acrylics and mixtures thereof.
- 10) The liner of claim 7 wherein said laminate is apertured to produce apertures with an open area of 20 to 40 percent of the total surface area.
- 11) The liner of claim 7 wherein said apertures in said first and second nonwoven layers are aligned.
- 12) The liner of claim 11 as a component of a personal care product.
- 13) A pantiliner comprising a liquid permeable liner, a liquid impervious baffle, and an absorbent core

positioned therebetween, wherein said liner comprises a hydrophilic first bodyside apertured nonwoven layer laminated by a spunlace process with a hydrophobic second apertured nonwoven layer.

- 14) The pantiliner of claim 13 wherein the apertures of the first layer and the apertures of the second layer are aligned.
- 15) A process of making a liner for personal care products comprising hydroentangling a hydrophilic first bodyside nonwoven layer with a hydrophobic second nonwoven layer and aperturing said layers.
- 16) The process of claim 15 wherein said layers are apertured simultaneously to produce aligned apertures.

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### Conclusion

For the reasons stated above it is Appellants' position that the Examiner's rejection of claims has been shown to be untenable and should be **reversed** by the Board.

Please charge the \$330.00 fee, pursuant to 37 C.F.R. 1.17(c), for filing this Appeal Brief to Kimberly-Clark Worldwide, Inc. deposit account number 11-0875. Any additional prosecutorial fees which are due may also be charged to deposit account number 11-0875.

The undersigned may be reached at: (770) 587-8096

Respectfully submitted,

KIM ET AL.

By: 

William D. Herrick

Registration No.: 25,468

### CERTIFICATE OF MAILING

I, Nathan Hendon, hereby certify that on April 22, 2004 this document is being deposited with the United States Postal Service as first-class mail, postage prepaid, in an envelope addressed to: Mail Stop Appeal Brief - Patents, Commissioner for Patents, P.O. Box 1450, Alexandria, VA 22313-1450.

By: 

Nathan Hendon